

Figure 1

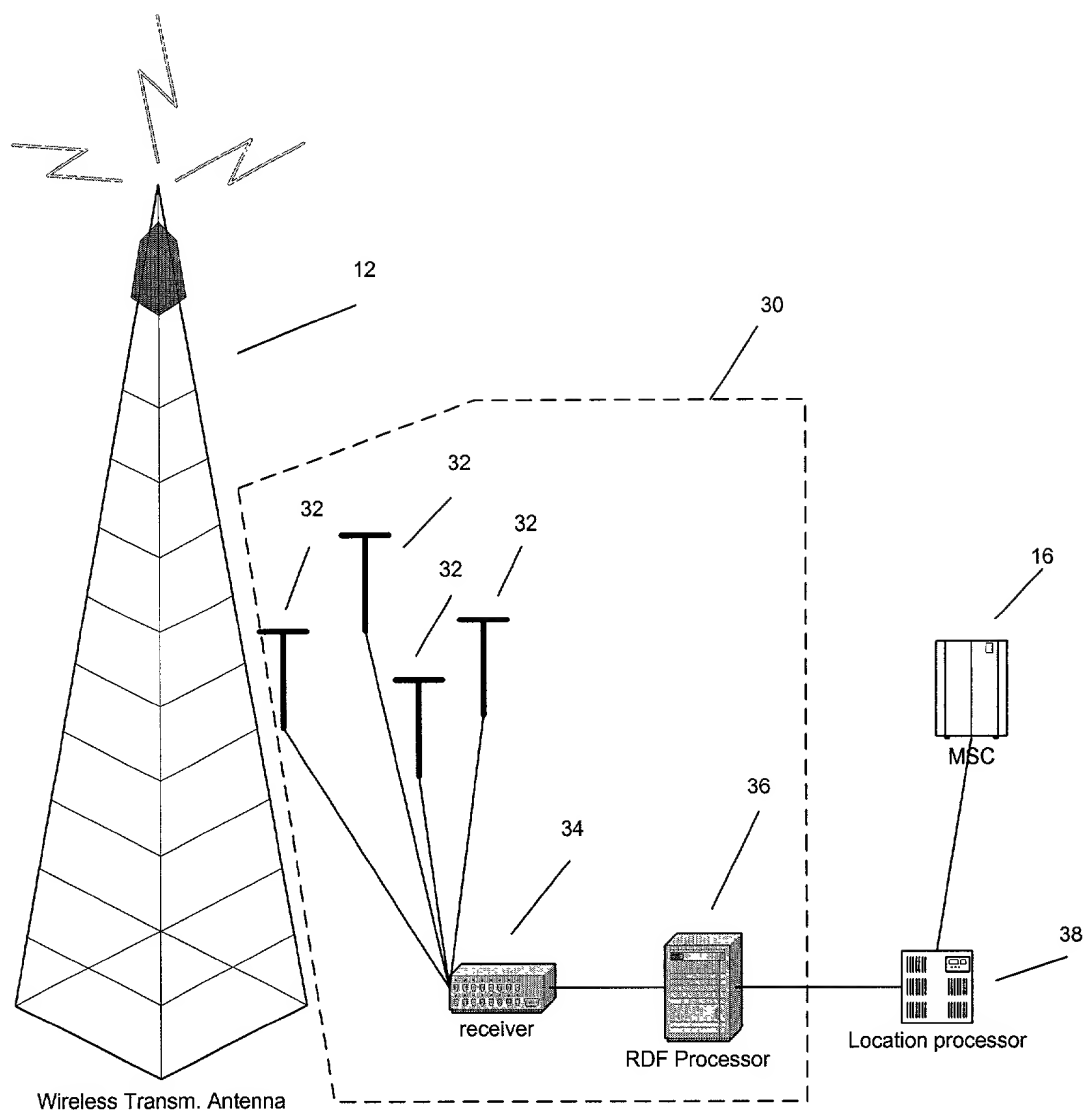


Figure 2

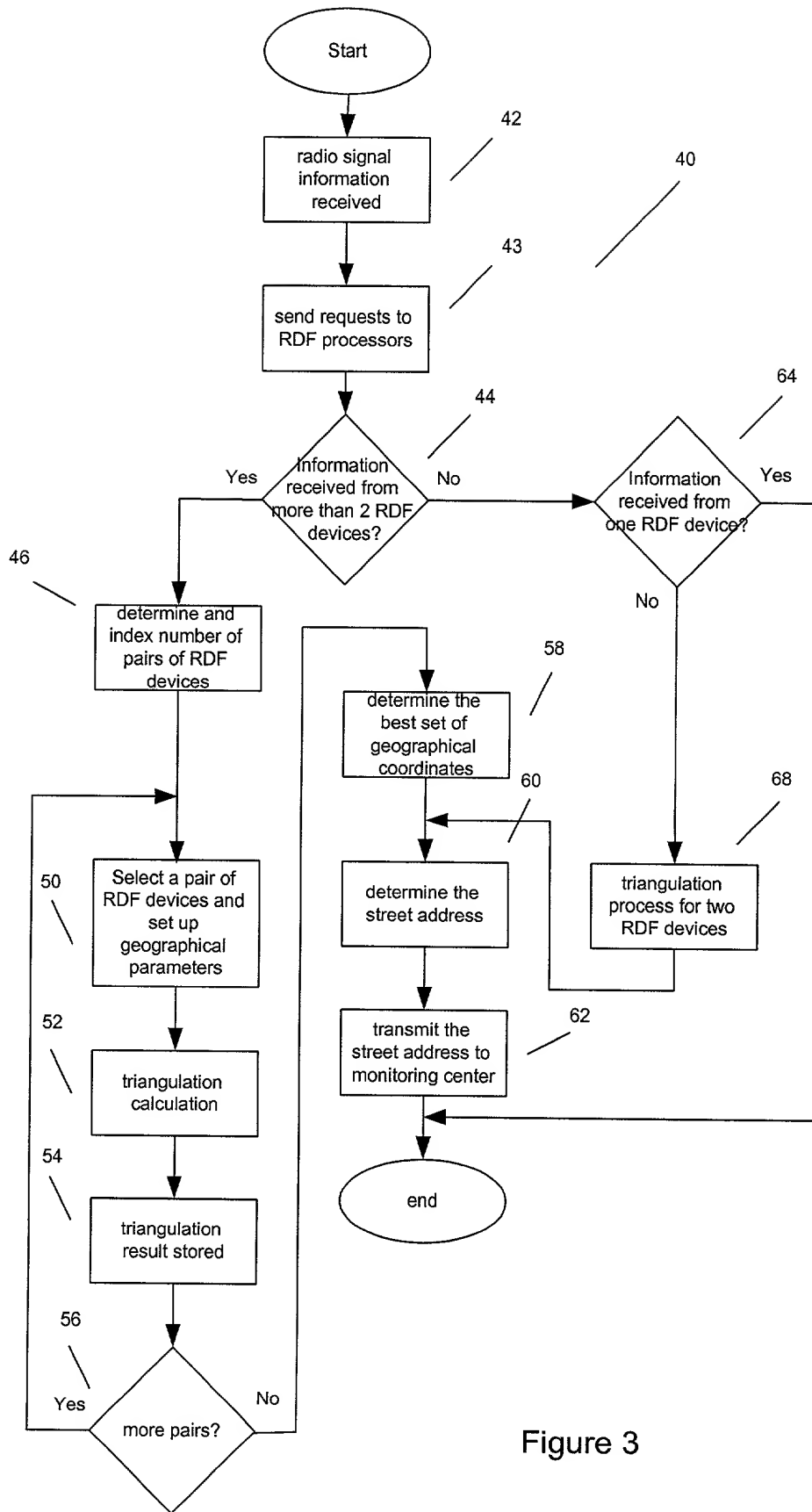


Figure 3

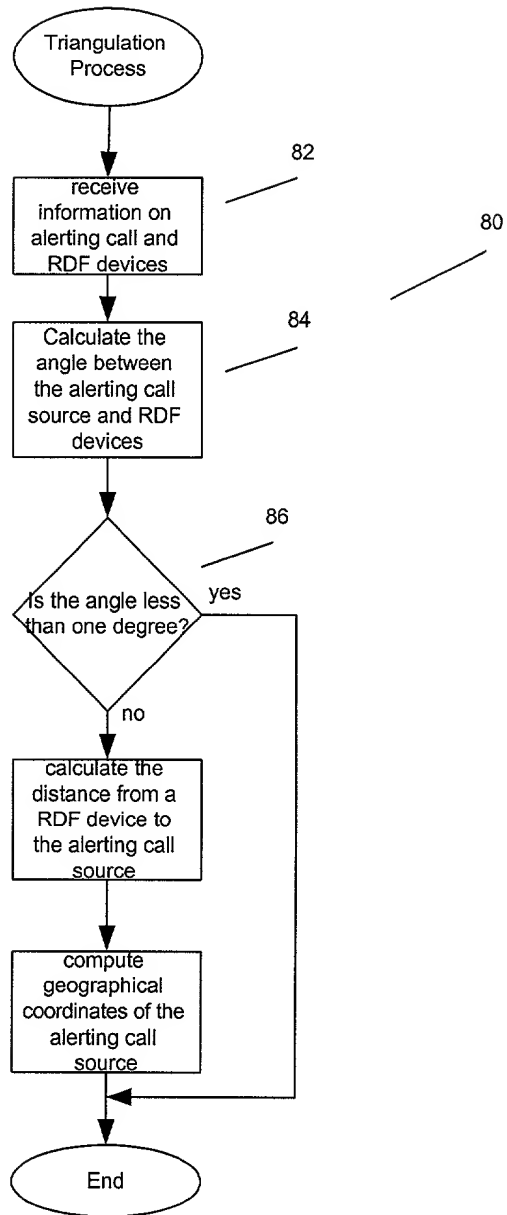
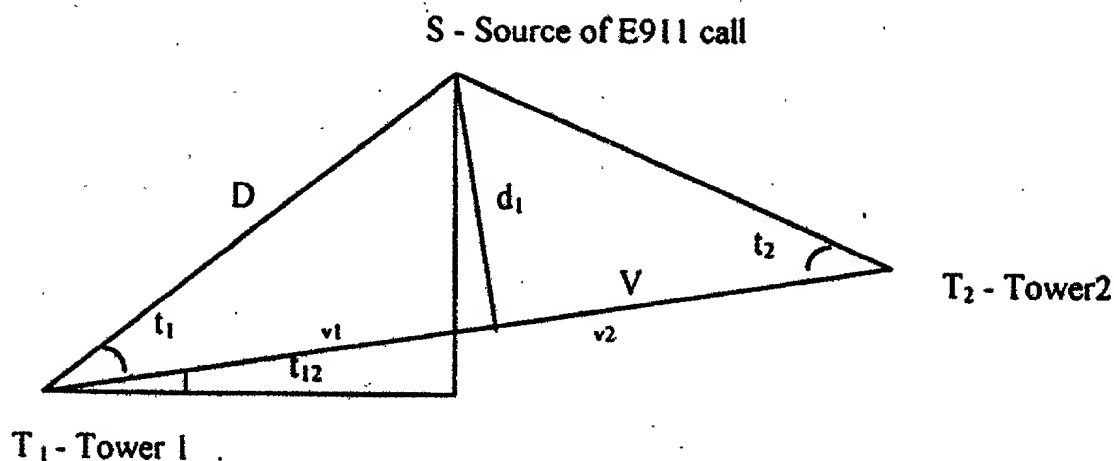


Figure 4



DEFINITIONS

d_1 is the perpendicular distance from Source, S, to the vector, V, connecting T_1 and T_2

D is the derived distance from S to T_1

V is the length of the vector from T_1 to T_2

v_1 is the distance from T_1 to d_1

t_1 is the angle from S to T_2

t_{12} is the angle at T_1 from the vector, V, to a line representing the Latitude of T_1

t_2 is the angle from S to T_1

V is the sum of v_1 and v_2

$$v_1 = V (\tan t_2) / [(\tan t_1) + (\tan t_2)] \quad \text{Equation 1}$$

$$D = v_1 / \cos t_1 \quad \text{Equation 2}$$

$$\text{Source Latitude} = T_1 \text{ Latitude} + D \sin (t_1 + t_{12}) \quad \text{Equation 3}$$

$$\text{Source Longitude} = T_1 \text{ Longitude} + D \cos (t_1 + t_{12}) \quad \text{Equation 4}$$

FIG 5.

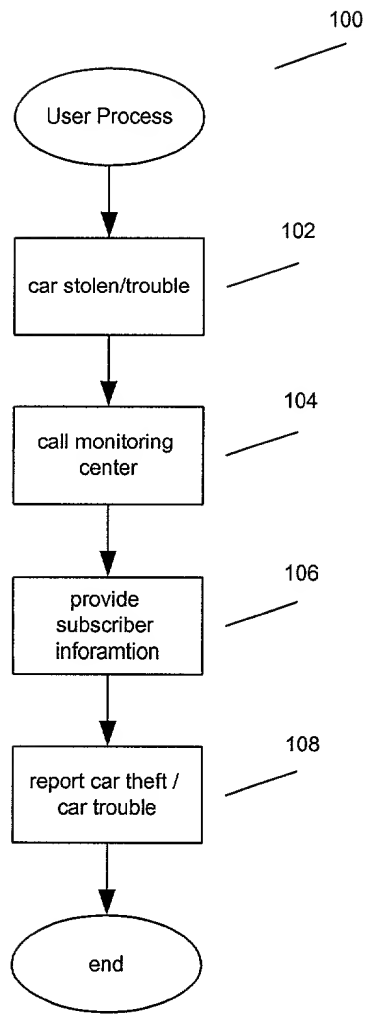


Figure 6

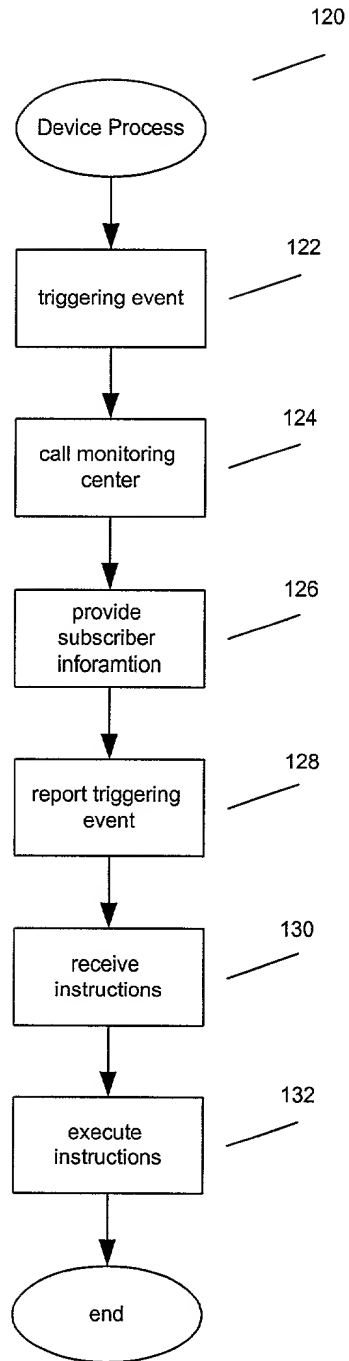


Figure 7

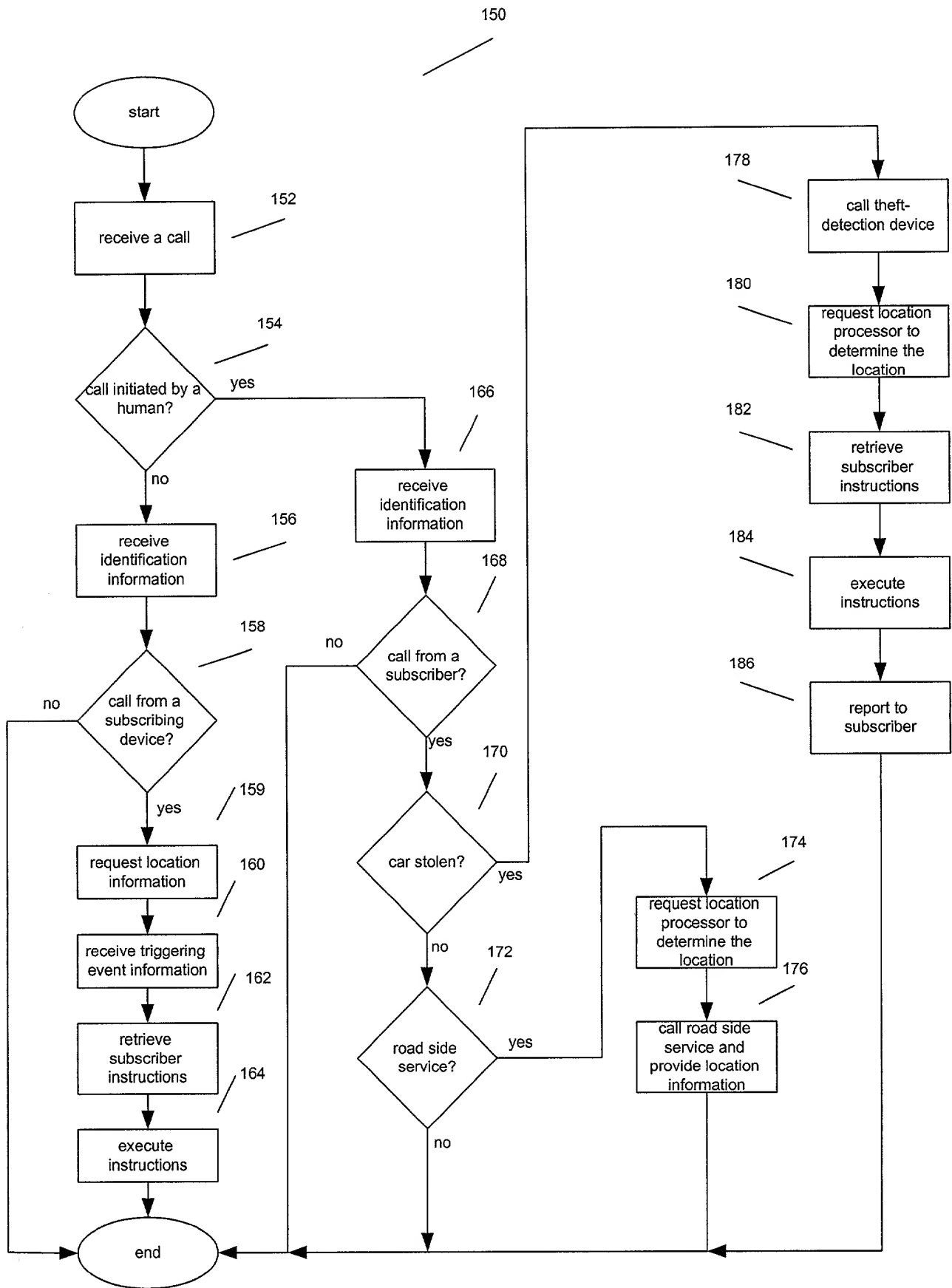


Figure 8

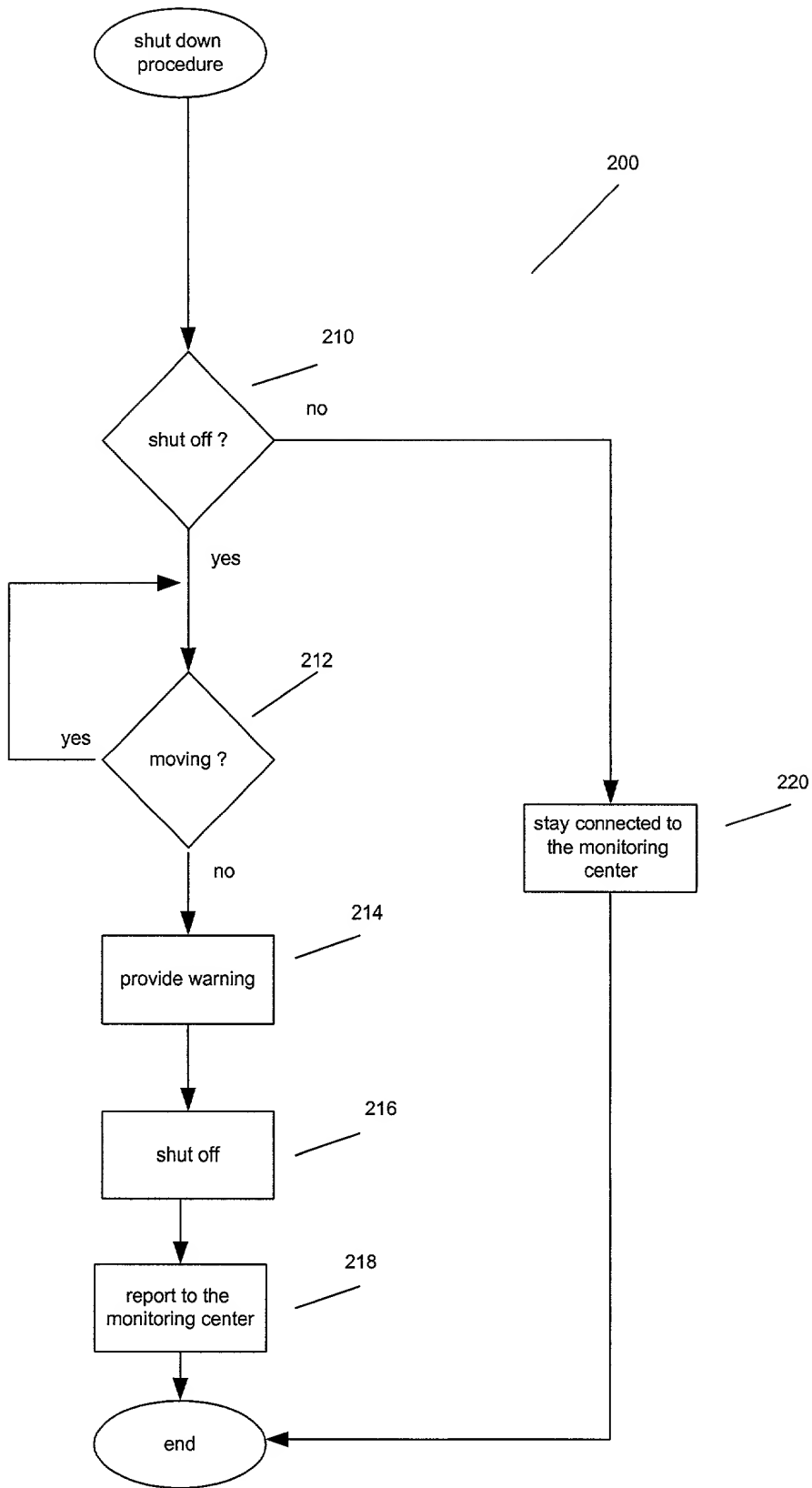


Figure 9

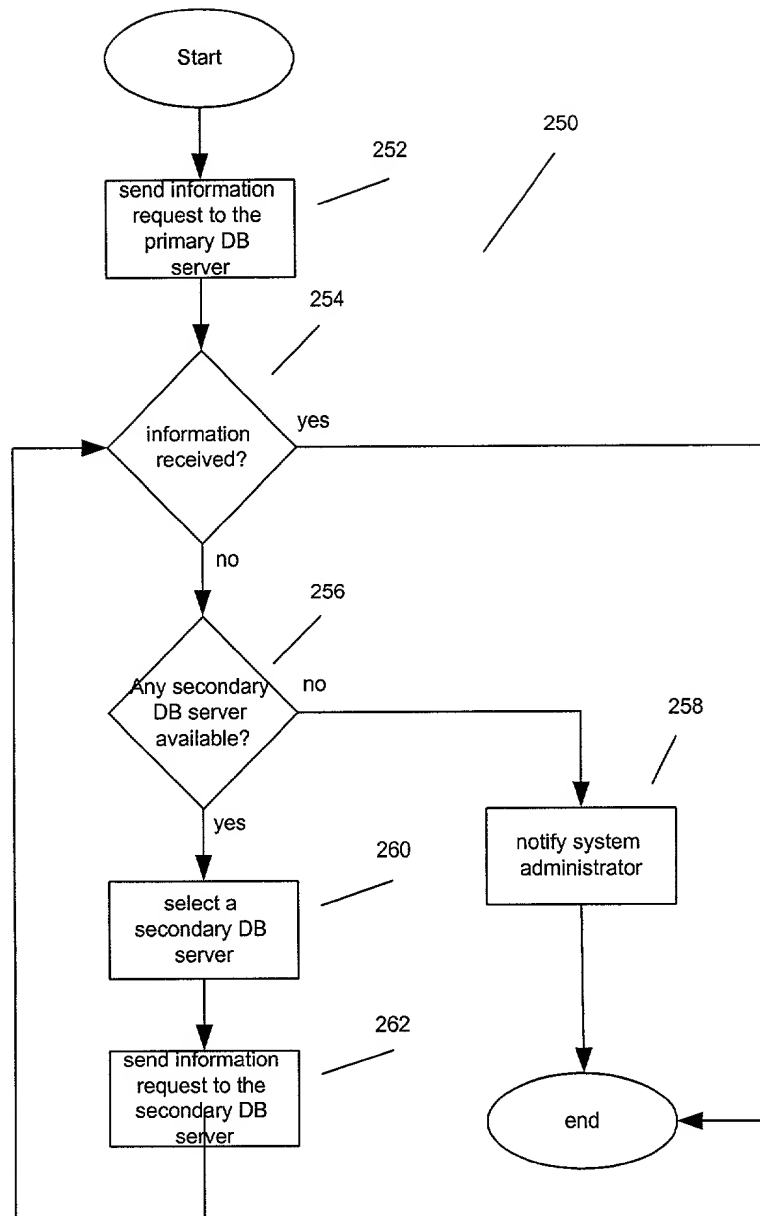


Figure 10

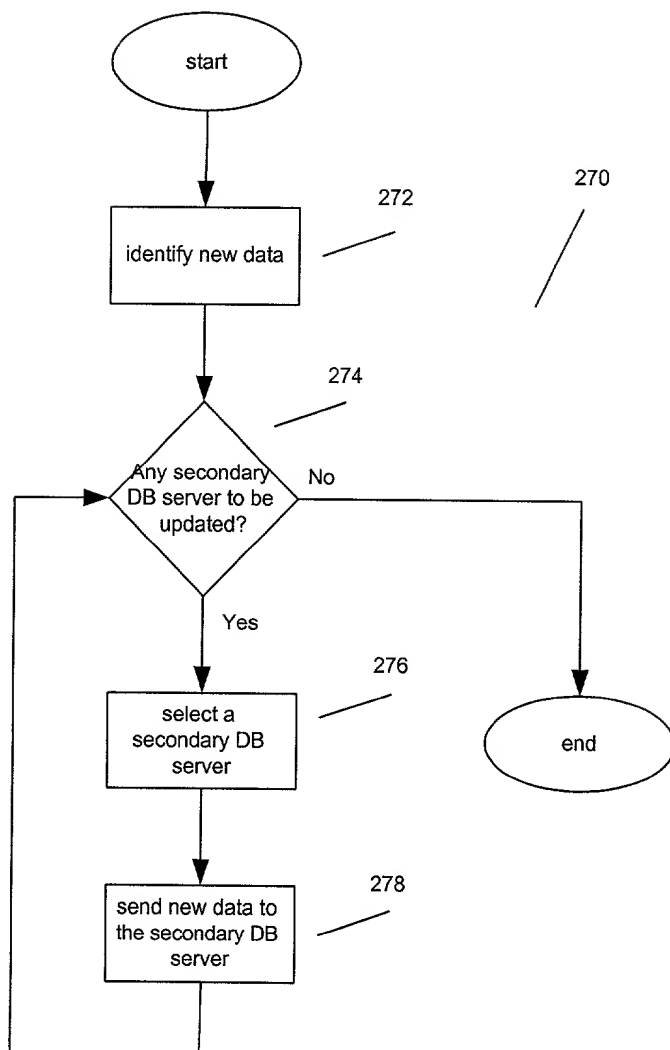


Figure 11